



U.S. Department
of Transportation

**Federal Aviation
Administration**

Office of the Administrator

800 Independence Ave., S.W.
Washington, D.C. 20591

May 29, 2019

The Honorable Richard Shelby
Chairman, Committee on Appropriations
United States Senate
Washington, DC 20510

Dear Mr. Chairman:

House Report 115-237, Departments of Transportation, and Housing and Urban Development, and Related Agencies Appropriations Bill, 2018, requests that the Federal Aviation Administration (FAA) submit a report to the House and Senate Committees on Appropriations within 180 days of enactment describing what actions the FAA plans to take to improve the safety of flying with a lap-held infant, including recommendations on minimum performance standards for lap-held restraints. This letter explains the FAA's position and actions on this issue.

While the FAA permits lap-held children, the safest way for children to travel is in either an approved automotive child restraint system (CRS) or an Aviation Child Safety Device (ACSD) appropriate for the child's age, weight, and used in a seat occupied solely by the child. FAA research and testing on child restraint systems shows that both lap-held children and children in lap-held devices are not protected during emergency landings. For this reason, the FAA does not plan to develop standards specifically for lap-held child restraints.

The FAA has published safety standards for child restraints and for aircraft seats that must be met to obtain FAA approval of any restraint system. The regulations that permit lap-held children or approved child restraint systems are in Title 14, Code of Federal Regulations (14 CFR) 91.107, 121.311, 125.211, and 135.128. These regulations prohibit the use of a lap-held CRS during takeoff, landing, and movement on the surface, except when the CRS has been approved by the FAA. The FAA does not prohibit the use of lap-held restraints during flight (after takeoff and before landing). The FAA issued Advisory Circular (AC) 120-87C, Use of Child Restraint Systems on Aircraft, that explains the FAA approval processes for CRS as well as providing guidance on the use of such systems for operators. Automotive CRSs are approved under the National Highway Traffic Safety Administration's (NHTSA) Federal Motor Vehicle Safety Standard (FMVSS) 213, that includes a testing portion to account for the aviation environment. The FAA safety standard for a system that would be used only in an aircraft is Technical Standard Order (TSO) C100c, Aviation Child Safety Device. These safety standards require crash testing of the seat and restraint system with appropriately instrumented test dummies to measure whether serious injury to the occupants might result.

Manufacturers of lap-held restraints contend the FAA should approve their child restraint system by comparing its performance to that of lap-held children, rather than to children in approved child restraint devices. However, the report¹ shows that both lap-held children and children in lap-held restraints will likely suffer serious injury or fatalities in emergency landing conditions.

Test videos submitted to the FAA, most recently in 2015, by companies seeking FAA approval for lap-held restraints showed significant body-to-body contact between an infant in the restraint and the adult on whose lap the infant is sitting during an emergency crash landing, which the FAA believes would result in serious injury or death of the infant and injuries to the adult. The FAA determined that, because of these serious safety issues, developing lesser safety standards to certify these types of devices would convey a false sense of safety to parents of children using these devices.

In the past, the National Transportation Safety Board recommended the FAA remove the allowance for lap-held children on airplanes. In May 1999, the U.S. Department of Transportation (DOT) completed an analysis supplementing a 1995 FAA study on the economic impact and risk of eliminating the rules permitting lap-held children. The DOT analysis confirmed the FAA conclusion that airline costs would cause families to divert to other transportation modes or forego travel, and air travelers who divert to other modes of transportation would be exposed to the higher injury and mortality rates associated with those modes. The DOT analysis showed a resulting net increase in deaths and injuries if highway risks were considered. Since the DOT and FAA were not able to show a positive safety benefit, we decided not to pursue rulemaking to mandate the use of CRSs in aircraft for children under 2 years of age.

In summary, the FAA's position is that the safest way for children to travel is in an independent seat in an FAA-approved CRS. The FAA has not approved any lap-held restraints for use during take-off and landing because, as noted above, none of the lap-held restraints proposed to the FAA to date are capable of protecting occupants in an emergency crash landing. FAA approval of these lap-held devices would give parents a false impression of safety for the child in the device. Therefore, in order to improve the safety of flying with young children, the FAA will seek to increase voluntary use of approved CRSs. To increase CRS use, the FAA will continue to educate parents and encourage them to make informed decision about traveling with young children by providing guidance at https://www.faa.gov/travelers/fly_children/.

¹ DOT/FAA/AAM-94/19, The Performance of Child Restraint Devices In Transport Airplane Passenger Seats, September 1994

We have sent identical letters to Vice Chairman Leahy, Chairwoman Lowey, and Ranking Member Granger.

Sincerely,

A handwritten signature in black ink, appearing to read "DK Elwell". The letters are cursive and fluid, with the first name "DK" being more prominent and the last name "Elwell" following in a similar style.

Daniel K. Elwell
Acting Administrator



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800 Independence Ave., S.W.
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May 29, 2019

The Honorable Nita Lowey
Chairwoman, Committee on Appropriations
House of Representatives
Washington, DC 20515

Dear Chairwoman:

House Report 115-237, Departments of Transportation, and Housing and Urban Development, and Related Agencies Appropriations Bill, 2018, requests that the Federal Aviation Administration (FAA) submit a report to the House and Senate Committees on Appropriations within 180 days of enactment describing what actions the FAA plans to take to improve the safety of flying with a lap-held infant, including recommendations on minimum performance standards for lap-held restraints. This letter explains the FAA's position and actions on this issue.

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We have sent identical letters to Ranking Member Granger, Chairman Shelby, and Vice Chairman Leahy.

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Daniel K. Elwell
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May 29, 2019

The Honorable Kay Granger
Committee on Appropriations
House of Representatives
Washington, DC 20515

Dear Ranking Member Granger:

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Committee on Appropriations
United States Senate
Washington, DC 20510

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